

The opinion in support of the decision being entered today was not written for publication and is not binding precedent of the Board.

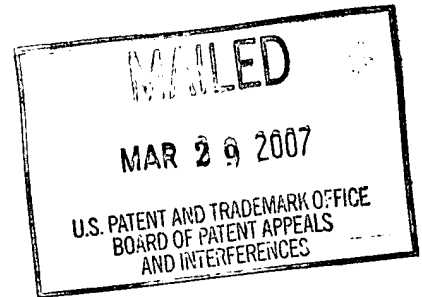
## UNITED STATES PATENT AND TRADEMARK OFFICE

### BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Ex parte ROBERT S. BOSKO

Appeal No. 2007-0379  
Application No. 10/045,301

ON BRIEF



Before ADAMS, GRIMES, and GREEN, Administrative Patent Judges.

ADAMS, Administrative Patent Judge.

#### DECISION ON APPEAL

This is a decision on the appeal under 35 U.S.C. § 134 from the examiner's final rejection of claims 1, 6-8, 11-15, and 18-31, which are all the claims pending in the application.

Claims 1 and 20 are illustrative of the subject matter on appeal and are reproduced below:

1. A water-using unit, comprising:
  - a cabinet;
  - a treated water source sharing at least part of said cabinet such that said treated water source is integral with the water-using unit, said treated water source comprising a reverse osmosis water treatment system including a flexible reservoir in which water treated by said reverse osmosis water treatment system is stored;
  - a host system performing host functions, said host system coupled to said cabinet and to said treated water source, said host system comprising a cooling source, and wherein said reservoir is located in

cooling proximity to said cooling source so as to allow cooling of said water in said flexible reservoir; and  
a control system coupled to and controlling operation of said treated water source and said host system.

20. A system, comprising:

a water-using unit having a cabinet and a first user access area, said water-using unit including a treated water source sharing at least part of said cabinet such that said treated water source is integral with said water-using unit and further including a host system performing host functions, said host system coupled to said treated water source; and

a separate unit remote from said water-using unit such that said separate unit does not share said cabinet, said separate unit having a second user access area, said separate unit supplied by said treated water source, and wherein said first and second user access areas are not presented as a combined user access area.

The references relied upon by the examiner are:

Voznick et al. (Voznick)	5,256,279	Oct. 26, 1993
Blades	5,536,411	Jul. 16, 1996
Credle	5,992,685	Nov. 30, 1999
Boulter	6,093,312	Jul. 25, 2000

GROUND OF REJECTION

I. Claims 1, 6-8, 11-15, and 18-31 stand rejected under 35 U.S.C. § 112, first paragraph, as lacking adequate written descriptive support.

II. Claims 20-25, 27, and 31 stand rejected under 35 U.S.C. § 102(b) as anticipated by or, in the alternative, under 35 U.S.C. § 103 as obvious over Boulter.

III. Claims 26 and 28-30 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter and Credle.

IV. Claims 1, 8, and 12-14 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter and Voznick.

V. Claims 6, 7, 11, and 12 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter, Voznick, and Blades.

VI. Claims 15, 18, and 19 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter, Voznick, and Credle.

We reverse.

### CLAIM INTERPRETATION

Appellant's figures 1, 2, and 6 are reproduced below to facilitate our discussion of appellant's claims 1 and 20.

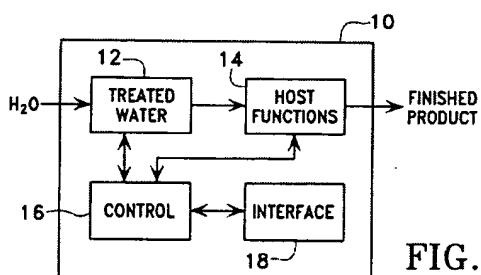


FIG. 1

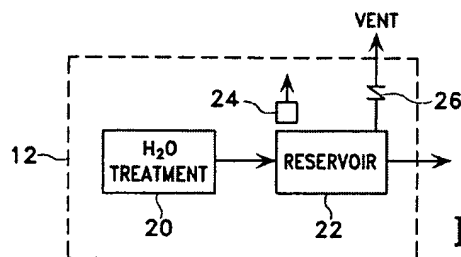


FIG. 2

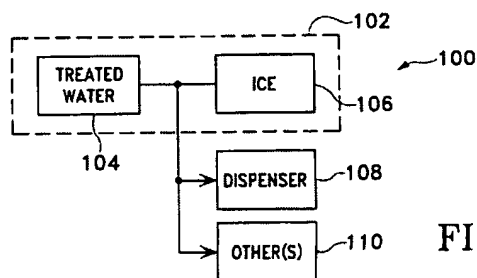


FIG. 6

### Claim 1:

Claim 1 is drawn to a water-using unit 10, 102. The water using unit comprises four parts: (1) a cabinet; (2) a treated water source 12; (3) a host system performing host functions 14; and (4) a control system 16.

The cabinet:

Appellant's specification provides the following single disclosure regarding the concept of a cabinet:

manufacturing and maintenance costs are reduced, because the treated water source is built in as part of the host equipment, thereby eliminating the need for two cabinets, two sets of electronic controls, and other redundant systems. Similarly, installation costs are greatly reduced, as only one piece of equipment needs to be installed.

Specification, page 6, lines 8-12, emphasis added.

The treated water source 12:

According to claim 1, the treated water source **12** shares at least part of the cabinet such that said treated water source **12** is integral with the water-using unit **10**, **102**. In addition, claim 1 requires that the treated water source **12** comprise (i) a reverse osmosis water treatment system **20**<sup>1</sup> including (ii) a flexible reservoir **22** in which water treated by the reverse osmosis water treatment system **20** is stored.

The host system 14, 106:

According to claim 1 the host system performs host functions **14**, **106**. According to appellant's specification "[s]uch host functions [**14**, **106**] may include, without limitation, ice-making, beverage dispensing, and storage of cool

---

<sup>1</sup> According to appellant's specification (page 6, lines 16-17), the "treated water source **12** may include a water treatment unit **20**, such as an R/O [(reverse osmosis)] unit, coupled to a reservoir **22**. The reservoir **22** is preferably a flexible laminate bag."

water (for example for dispensing of cold water)." Specification, page 9, lines 20-22.

According to claim 1, the host system **14, 106** is coupled to the cabinet and to the treated water source **12, 104**. In addition, claim 1 requires that the host system **14, 106** comprises a cooling source<sup>2</sup>. Further, claim 1 requires that the reservoir **22** be "located in cooling proximity to said cooling source so as to allow cooling of said water in said flexible reservoir **[22]**."

The control system **16**:

According to claim 1, the control system **16** is coupled to and controls the operation of the treated water source **12, 104** and the host system **14, 106**. According to appellant's specification (bridging paragraph, pages 5-6), "[t]he control system **[16]** may include a microprocessor or microcontroller, and various inputs and output ports to effect the control. The control system **[16]** interfaces with various sensors or switches to control operation."

Claim 20:

Claim 20 is drawn to a system **100**. The system **100** comprises two parts: (1) a water-using unit **10, 102**; and (2) a remote separate unit **108, 110**.

According to claim 20, the water-using unit **10, 102** has a cabinet and a first user access area. The water-using unit **10, 102** of claim 20 includes a

---

<sup>2</sup> See, e.g., appellant's Figure 3, which according to appellant's specification (page 8, lines 15-19), "illustrates a more detailed example of a particular treated water source according to the teachings of the present invention, incorporated in a unit that includes a cooling unit for cooling water and/or producing ice. The cooling unit shown in FIGURE 3 is a vapor compression cycle refrigeration system that includes a condenser **30** and an evaporator **32**."

treated water source **12, 104** that shares at least part of said cabinet such that said treated water source **12, 104** is integral with said water-using unit **10, 102**.

In addition, the water-using unit **10, 102** of claim 20 includes a host system **14, 106** performing host functions. The host system **14, 106** of claim 20 is coupled to a treated water source **12, 104** and a separate unit **108, 110** that is remote from water-using unit **10, 102** such that said separate unit **108, 110** does not share the same cabinet. Claim 20, however, requires that the separate unit **108, 110** is supplied by the same treated water source **12, 104** as the water-using unit **10, 102**.

Claim 20 also requires the separate unit **108, 110** to have a second user access area, wherein said first and second user access areas are not presented as a combined user access area.

### DISCUSSION

#### New Matter:

Claims 1, 6-8, 11-15, and 18-31 stand rejected under 35 U.S.C. § 112, first paragraph, as lacking adequate written descriptive support.

According to the examiner, “[c]laims 1, 20 and 31, as amended, recite the treated water source as sharing at least a part of a cabinet to have the treated water source integral with the water-using unit [**10, 102**].” Answer, page 3. The examiner finds, however, that appellant’s specification fails to describe this structure. Id. According to the examiner, the specification does not demonstrate “how the cabinet would make the units integral.” Id. In addition, the examiner

finds that “[c]laim 20, as amended, also has the limitation [that] ‘said separate unit **[108, 110]** does not share said cabinet’.” Id. According to the examiner, “[t]his negative limitation is not supported by the disclosure in the specification and claims as originally filed.” Answer, bridging sentence, pages 3-4. In the examiner’s opinion, appellant’s specification “do[es] not provide a disclosure for separate cabinets.” Answer, page 4.

In response appellant directs attention to page 6, lines 8-12 of the specification. Page 6, lines 5-12 specification (emphasis added) states that

[b]y designing equipment with an integral treated water source, significant advantages are achieved. For example, as will be discussed in detail below, water and energy conservation can be significantly enhanced, for example by using input or drain water to cool the condenser in systems that include vapor compression refrigeration systems. Furthermore, manufacturing and maintenance costs are reduced, because the treated water source is built in as part of the host equipment, thereby eliminating the need for two cabinets, two sets of electronic controls, and other redundant systems. Similarly, installation costs are greatly reduced, as only one piece of equipment needs to be installed.

As we understand it, this section of appellant’s specification discloses the advantages of an integrated system wherein both the treated water source and the host equipment are included in a single cabinet. However, the examiner asserts (Answer, page 3, emphasis added), “[w]hile having a shared cabinet may be construed as being disclosed by the [sic] lines 8-11 of page 6 of the specification, these lines do not provide the disclosure to support the claim limitation that the cabinet would make the water source and water-using unit integral.” We disagree.

In our opinion, page 6, lines 8-12 of appellant's specification clearly explains that equipment designed to have a water source integrated (e.g., in the same cabinet) with a host system has both manufacturing and maintenance advantages over a system wherein these components are not integrated, e.g, are separated into separate cabinets. As to claim 20, the examiner recognizes that "logic and common-sense tell that units in proximity could be housed in a single cabinet, and remote units require separate cabinets (as argued by the appellant). . . ." Answer, page 10. We agree.

The written description is determined from the perspective of what the specification conveys to one skilled in the art. In re GPAC Inc., 57 F.3d 1573, 1579, 35 USPQ2d 1116, 1121 (Fed. Cir. 1995); Vas-Cath Inc. v. Mahurkar, 935 F.2d 1555, 1563-64, 19 USPQ2d 1111, 1117 (Fed. Cir. 1991). Thus, the specification need not always spell out every detail; only enough "to convince a person of skill in the art that the inventor possessed the invention and to enable such a person to make and use the invention without undue experimentation." LizardTech, Inc., v. Earth Resource Mapping, Inc., 424 F.3d 1336, 1345, 76 USPQ2d 1724, 1732 (Fed. Cir. 2005).

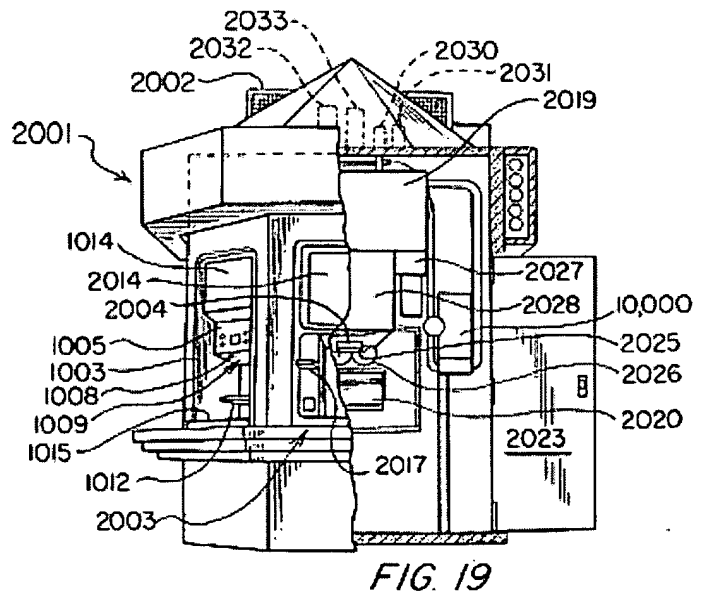
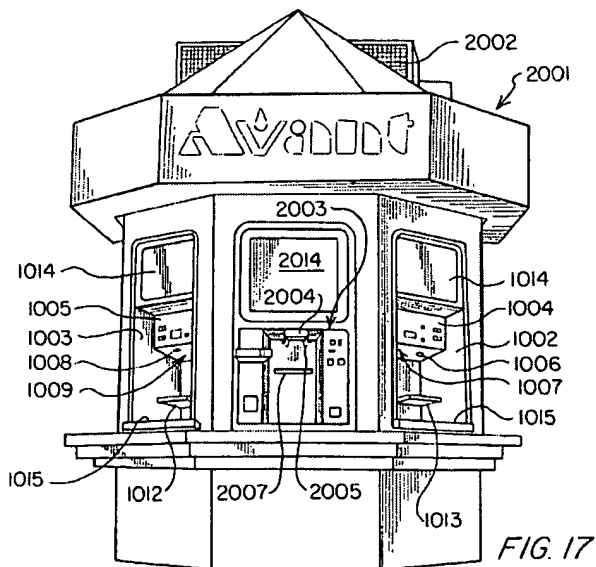
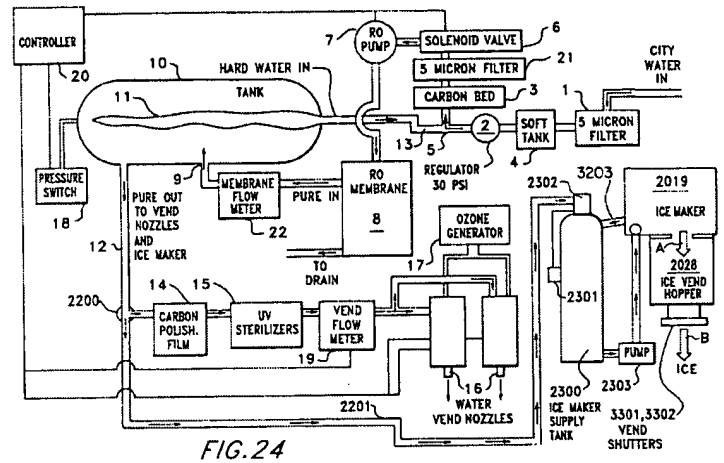
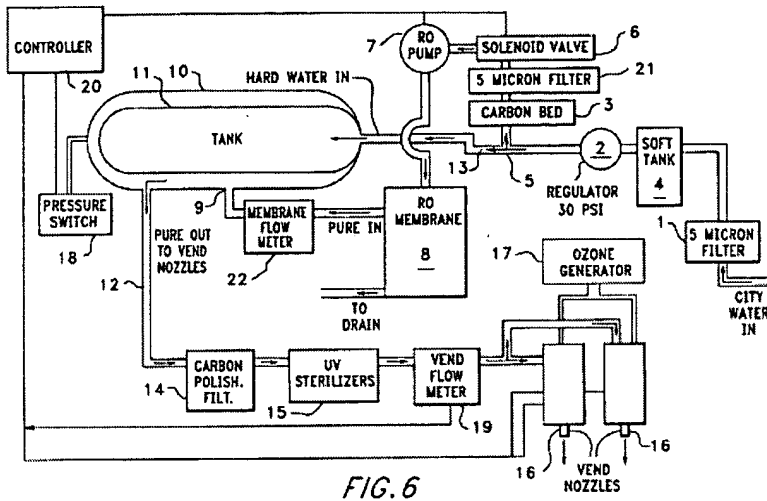
On reflection, it is our opinion, appellant's specification provides a description of the invention that would convince a person of ordinary skill in the art the invention possessed the claimed invention. Accordingly, we reverse the rejection of claims 1, 6-8, 11-15, and 18-31 under the written description provision of 35 U.S.C. § 112, first paragraph.



Anticipation/Obviousness:

Boulter:

Claims 20-25, 27, and 31 stand rejected under 35 U.S.C. § 102(b) as anticipated by or, in the alternative, under 35 U.S.C. § 103 as obvious over Boulter. For clarity, we reproduce Boulter's Figures 6, 17, 19, and 24 below.



According to the examiner (Answer, page 4), Boulter “teaches a water-using unit (16-fig 6) having a cabinet (fig 17-19), treated water source (8-fig 6), a host system (fig 24,[ ]26), control system (fig 24,[ ]26), and a separate remote unit coupled to the unit (ice-maker **2028**, fig 24, and cooler system **2030-2033**, fig 19).”

According to Boulter,

[t]he present invention consists of a kiosk **[2001]** . . . [that] dispenses water in a coin-operated water-dispensing window **[1002, 1003]**. Additionally, an ice-dispensing window **[2003]** allows the consumer to buy bags of ice made from the purified water. . . . Kiosks **[2001]** can be configured with three dispensing windows. Any combination of water **[1002, 1003]** and ice dispensing **[2003]** windows can be installed.

Column 2, lines 9-34.

As appellant explains, “Boulter shows a traditional approach of using a treated water system to supply more than one water-using unit. However, in such a traditional system, the treated water system is a separate system, not integrated with any of the water-using units through common cabinetry.” Brief, page 7. We agree.

The examiner argues, however, that Boulter’s water source shares “at least part of the cabinet such that said treated water source is integral . . . .” Answer, page 5. According to the examiner (Answer, page 11), “[t]he kiosk can be a cabinet; it has the water source and the water-using unit (water dispenser), which meet the limitation of the claims.” We agree, that the kiosk can be a cabinet. We disagree, however, that the arrangement of Boulter’s components meet the

requirements of appellant's claimed invention. For example, while the examiner asserts that the kiosk is the cabinet, the examiner also asserts that the "remote dispenser has a separate cabinet." Answer, page 5. In this regard, the examiner asserts that "the kiosk is depicted as having separate compartments . . . [e.g.,] the icemaker with separate cabinet . . . and the ice bin (another separate cabinet) . . . ." As we understand the examiner's argument the host systems (e.g., water dispenser and ice maker) are separate cabinets within a common cabinet – the kiosk. This, however, is not what appellant has claimed. As appellant explains (Brief, page 7), "[i]f the kiosk is a common cabinet, then there can be no separate unit; and, if the kiosk is not a common cabinet, then there can be no integrated water treatment system and water-using unit." We agree.

In our opinion, the examiner failed to provide the evidence necessary to establish that appellant's claimed invention is anticipated<sup>3</sup> or obvious<sup>4</sup> in view of Boulter. At best, the examiner attempts to selectively define different components of Boulter's structure to conform them into what appellant has claimed. In our opinion this is nothing more than a hindsight reconstruction<sup>5</sup> of appellant's claimed invention. Accordingly, we

---

<sup>3</sup> "Under 35 U.S.C. § 102, every limitation of a claim must identically appear in a single prior art reference for it to anticipate the claim." Gechter v. Davidson, 116 F.3d 1454, 1457, 43 USPQ2d 1030, 1032 (Fed. Cir. 1997).

<sup>4</sup> "A prima facie case of obviousness is established when the teachings from the prior art itself would appear to have suggested the claimed subject matter to a person of ordinary skill in the art." In re Bell, 991 F.2d 781, 783, 26 USPQ2d 1529, 1531 (Fed. Cir. 1993) (quoting In re Rinehart, 531 F.2d 1048, 1051, 189 USPQ 143, 147 (CCPA 1976)).

<sup>5</sup> In re Dembiczak, 175 F.3d 994, 999, 50 USPQ2d 1614, 1617 (Fed. Cir. 1999) ("Combining prior art references without evidence of such a suggestion, teaching, or motivation simply takes the

reverse the rejection of claims 20-25, 27, and 31 under 35 U.S.C. § 102(b) as anticipated by or, in the alternative, under 35 U.S.C. § 103 as obvious over Boulter.

The combination of Boulter and Credle:

Claims 26 and 28-30 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter and Credle. Claims 26 and 28-30 ultimately depend from claim 20.

The examiner contends that Boulter “teaches all the limitations of claim 20.” Answer, page 8. The examiner finds that “[c]laims 26 and 28-30 add further limitations as follows: beverage dispenser as in instant claims 26 and 28.” Id. While the examiner does not so state, it appears that the examiner is of the opinion that Boulter does not teach a beverage dispenser. Therefore, the examiner relies on Credle to make up for this deficiency in Boulter. According to the examiner (id.), “Credle [sic] teaches a water-using unit with a beverage dispenser as in instant claims 26 and 28. . . .” Based on these findings the examiner asserts that “[i]t would be obvious to one of ordinary skill in the art at the time of invention to have the Boulter R/O system coupled/connected to the beverage dispenser of Credle [sic]. . . to have a filtered fluid before dispensing as taught by Credle [sic].” Id.

For the reasons set forth above, we disagree with the examiner’s assertion that Boulter teaches all the limitations of claim 20. We find nothing in

---

inventor’s disclosure as a blueprint for piecing together the prior art to defeat patentability—the essence of hindsight.”).

Credle to make up for the deficiencies in Boulter set forth above. Accordingly, we reverse the rejection of claims 26 and 28-30 under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter and Credle.

The combination of Boulter and Voznick:

Claims 1, 8, and 12-14 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter and Voznick.

To facilitate our discussion, we direct attention to Boulter's Figure 24 reproduced above. According to the examiner (Answer, page 7, emphasis added), Boulter

teaches a water-using unit . . . comprising a cabinet . . . , treated water source (**2300**), a host system (fig 24,[ ]26), control system (fig 24,[ ]26), a separate remote unit coupled to the unit (water dispenser - ozonator 16,[ ]17 . . . ) and a cooling source located in cooling proximity to the reservoir ( . . . ice maker [**2019**] is a cooling source in cooling proximity to the reservoir **2301**) as in instant claim 1. The reservoir **2301** is proximate to the ice maker **2019**, and therefore, inherently would have cooling proximity, as in the applicant's invention disclosed in page 9 lines 15-20<sup>[6]</sup> . . . .

The examiner finds that "Boulter does not teach a flexible reservoir for **2300** as in [appellant's] claim 1." Answer, page 7, emphasis added. To make up for this deficiency, the examiner relies on Voznick to teach "a reservoir having a bladder in which the reverse osmosis water is inside the bladder . . . ." Id. Based on these findings the examiner concludes that "[i]t would be obvious to one of ordinary skill in the art at the time of invention to use the teaching of Voznick in

---

<sup>6</sup> According to page 9, lines 15-18 of appellant's specification "[i]n a preferred embodiment, the reservoir 42 is located in close proximity to evaporator . . . or other cooling source (such as, without limitation, ice in the ice bin of an ice maker or dispenser), to cool (pre-chill) the water within the reservoir."

the teaching of Boulter to have the Reverse Osmosis-treated water inside the bladder for controlling the water stored in the bladder as taught by Voznick without having significant backpressure and prevent air-borne bacteria, etc. . . .”

Answer, bridging sentence, pages 7-8.

In response, appellant asserts that “Boulter does not teach cooling proximity, and it does not teach integrating the reservoir with the water-using unit for this cooling proximity.” Brief, page 11, emphasis removed. We agree.

According to Boulter (column 6, lines 21-35), figure 19 illustrates the kiosk **2001**

in a partial cutaway view with the service door **2023** open. . . . A commercial ice-cube maker **2019** is mounted above the ice bin **2028**. . . . An air cooler **2027** circulates cold air inside the ice bin **2028** to prevent melting of the ice. The air cooler **2027** has a compressor **2030** and a receiver tank **2031**. The ice-cube maker **2019** has a compressor **2032** and a receiver tank **2033**. The units **2030-2033** are located on the roof of the kiosk **2001** for space saving and maintainability considerations since the inside of the kiosk **2001** is filled with a water-purification system as shown in Figs. **22, 23**.

On reflection, contrary to the examiner’s intimation, we find nothing in Boulter to suggest integrating the reservoir with the water-using unit or to otherwise place the reservoir in “cooling proximity” to the water-using unit. Voznick fails to make up for this deficiency in Boulter. Accordingly, we reverse the rejection of claims 1, 8, and 12-14 under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter and Voznick.

The combination of Boulter, Voznick and Blades:

Claims 6, 7, 11, and 12 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter, Voznick, and Blades. The

examiner relies on the combination of Boulter and Voznick as set forth above.

According to the examiner (Answer, page 9), [i]instant claims add further limitations not taught by Boulter in view of Voznic, but taught by Blades . . .” the examiner then explains that Blades teaches a host system that uses reverse osmosis reject water, inlet water and a cooling source which as an evaporator.

According to the examiner (Answer, bridging paragraph, pages 9-10), “[i]t would be obvious to one of ordinary skill in the art at the time of invention to use the teachings of Blades in the teaching of Boulter in view of Voznick for energy recovery as taught by Blades in the ‘Boulter in view of Voznick’ system.”

On reflection, it is our opinion that Blades fails to make up for the deficiencies in the combination of Boulter and Voznic. Accordingly, we reverse the rejection of claims 6, 7, 11, and 12 under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter, Voznick, and Blades.


The combination of Boulter, Voznick and Credle:

Claims 15, 18, and 19 stand rejected under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter, Voznick, and Credle. The examiner relies on the combination of Boulter and Voznick as set forth above.


According to the examiner (Answer, page 9), “[i]nstant claims add further limitations, which Boulter in view of Voznick does not teach but taught by Credle as follows . . .” the examiner then explains that Credle teaches a beverage dispenser that includes a cooling source, a carbonator, and a supply of syrups and flavors.

In response, appellant points out that Credle fails to make up for the deficiencies in the combination of Boulter and Voznick. Brief, page 14. We agree. Accordingly, we reverse the rejection of claims 15, 18, and 19 under 35 U.S.C. § 103 as being unpatentable over the combination of Boulter, Voznick, and Credle.

REVERSED

  
Donald E. Adams  
Administrative Patent Judge

  
Eric Grimes  
Administrative Patent Judge

  
Lora M. Green  
Administrative Patent Judge

)  
)  
)  
)  
) BOARD OF PATENT  
)  
) APPEALS AND  
) INTERFERENCES  
)  
)  
)  
)



Appeal No. 2007-0379  
Application No. 10/045,301

Page 17

Dennis Braswell  
105 Soost Court  
Mobile, AL 36608